

? b 155

24jul03 13:40:14 User208669 Session D2351.1

\$0.28 0.079 DialUnits File1

\$0.28 Estimated cost File1

\$0.01 TELNET

\$0.29 Estimated cost this search

\$0.29 Estimated total session cost 0.079 DialUnits

File 155: MEDLINE(R) 1966-2003/Jul W3

(c) format only 2003 The Dialog Corp.

*File 155: Medline has been reloaded and accession numbers have changed. Please see HELP NEWS 155.

Set Items Description

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? s vaccine and vector and herpes?

. 73268 VACCINE

48034 VECTOR

66721 HERPES?

S1 100 VACCINE AND VECTOR AND HERPES?

? s dt=review?

S2 946386 DT=REVIEW?

? s s1 and s2

100 S1

946386 S2

S3 17 S1 AND S2

? ds

Set	Items	Description
S1	47	VACCINE AND VECTOR AND HERPES?
S2	0	DT=REVIEW?
S3	0	S1 AND S2
S4	13	HERPES? AND RABIES? AND VECTOR?
S5	78	VACCINE? AND VECTOR? AND HERPES? NOT S1
S6	233	RABIES AND RECOMBINANT
S7	154	PY<1997 AND S6

? log hold

24jul03 14:10:34 User208669 Session D2351.3

\$9.33 2.073 DialUnits File50

\$0.00 292 Type(s) in Format 6

\$74.00 37 Type(s) in Format 7

\$74.00 329 Types

\$83.33 Estimated cost File50

\$6.52 TELNET

\$89.85 Estimated cost this search

\$93.31 Estimated total session cost 2.861 DialUnits

Logoff: level 02.17.00 D 14:10:34

? ds

Set	Items	Description
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S1	104	HERPES? AND RABIES
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? log hold

24jul03 14:17:05 User208669 Session D2351.5

\$9.28 0.515 DialUnits File357

\$0.00 104 Type(s) in Format 6

\$25.84 8 Type(s) in Format 7

\$25.84 112 Types

\$35.12 Estimated cost File357

\$1.40 TELNET

\$36.52 Estimated cost this search

\$36.88 Estimated total session cost 0.593 DialUnits

Logoff: level 02.17.00 D 14:17:05

/5

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.

03600697 CAB Accession Number: 982213582

Biological and immunogenic properties of rabies virus glycoprotein expressed by canine herpesvirus vector.

Xuan XueNan; Tuchiya, K.; Sato, I.; Nishikawa, Y.; Onoderaz, Y.; Takashima, Y.; Yamamoto, A.; Katsumata, A.; Iwata, A.; Ueda, S.; Mikami, T.; Otsuka, H.

Department of Global Agricultural Science, Graduate School of Agricultural Science, University of Tokyo, 1-1-1 Yayoi, Bunkyo-ku, Tokyo 113, Japan.

Vaccine vol. 16 (9/10): p.969-976

Publication Year: 1998

ISSN: 0264-410X --

Language: English

Document Type: Journal article

To evaluate whether canine herpesvirus (CHV) could be used as a live vector for the expression of heterologous immunogenes, a recombinant canine herpesvirus (CHV) expressing glycoprotein (G protein) of rabies virus (RV) was constructed. The gene of G protein was inserted within the thymidine kinase gene of CHV YP11mu strain under the control of the human cytomegalovirus immediate early promoter. The G protein expressed by the recombinant CHV was processed and transported to the cell surface as in RV infected cells, and showed the same biological activities, including pH-dependent cell fusion and haemadsorption. The antigenic authenticity of the recombinant G protein was confirmed by a panel of monoclonal antibodies specific for G protein. Dogs inoculated intranasally with the recombinant CHV produced higher titres of virus neutralizing antibodies against RV than those inoculated with a commercial, inactivated rabies vaccine. It is suggested that the CHV recombinant-expressing G protein could be used as a vaccine to control canine rabies and that CHV may be useful as a vector to develop live recombinant vaccines against other infectious diseases in dogs. 48 ref.

Q12185, U82

Adonis

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.

02248407 CAB Accession Number: 902204462

A recombinant human adenovirus vaccine against rabies.

Prevec, L.; Campbell, J. B.; Christie, B. S.; Belbeck, L.; Graham, F. L.

Dr. L. Prevec, Department of Biology, LSB-429, McMaster University,
Hamilton, Ontario, L8S 4K1, Canada.

Journal of Infectious Diseases vol. 161 (1): p.27-30

Publication Year: 1990

ISSN: 0022-1899 --

Language: English

Document Type: Journal article

The control and worldwide eradication of rabies depends on the development of safe, effective, and economical vaccines that might be used in preexposure vaccination programs for man and animals. An infectious human adenovirus type 5 recombinant virus that contains the rabies glycoprotein gene, and which may serve as the prototype for a new class of vaccines against rabies, was constructed and tested. This recombinant, when administered by either the parenteral or oronasal route, was highly effective in eliciting good levels of rabies-neutralizing antibodies in the sera of dogs and mice. Mice immunized by the recombinant virus were protected from lethal intracerebral challenge with rabies virus. 20 ref.

Micro, (adonis?)

No comparison
@ conventional
Vaccine

7/7/15

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.

03270796 CAB Accession Number: 962212373

A replication-defective human adenovirus recombinant serves as a highly efficacious vaccine carrier.

Zhi QuanXiang; Yang YiPing; Wilson, J. M.; Ertl, H. C. J.

Virology (New York) vol. 219 (1): p.220-227

Publication Year: 1996

ISSN: 0042-6822 --

Language: English

Document Type: Journal article

31 ref.

QR1. V5, adonis

No comparison
@ conventional
Better than UV recomb.
for rabies

02450213 CAB Accession Number: 912255197

Infectious bovine rhinotracheitis virus vector that expresses foot-and-mouth disease virus epitopes on the surface of viral particles and virus-infected cells.

Kit, M.; Kit, S.; Little, S.; DiMarchi, R.; Gale, C.

NOS

Novagene Incorporated, Houston, TX 77057, USA.

Vaccines 91. Modern approaches to new vaccines including prevention of AIDS

p.327-331

Publication Year: 1991

Editors: Chanock, R.M.; Ginsberg, H.S.; Brown, F.; Lerner, R.A.

Publisher: Cold Spring Harbor Laboratory Press -- Cold Spring Harbor, NY 11724, USA

ISBN: 0-87969-367-3

Language: English

Document Type: Miscellaneous

The vector virus used to construct the IBRV-FMDV recombinant was the IBRV(NG) dltk, having thymidine kinase gene deletion and Novagene signature sequence insertion. Foreign DNA sequences inserted in-phase at the amino-terminal end of the IBR gIII gene are detailed. The genotype and phenotype of the recombinant were confirmed. Calves vaccinated i.m. developed virus-neutralizing antibodies to IBRV and protection from challenge; the significant concentrations of anti-FMDV antibodies are tabulated, and these were attained 21-28 days after vaccination. Protection from challenge with FMDV intradermally at 21 days was confirmed. The advantages of the recombinant included in vivo amplification of the FMDV VPi epitope, low cost of production without adjuvants, and, as a marker vaccine; vaccinated cattle and those infected with FMDV field strains can be distinguished serologically. 4 ref.

NOS

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03344954 CAB Accession Number: 972204302

Recombinant feline herpesvirus type 1 expressing immunogenic proteins inducible virus neutralizing antibody against feline calicivirus in cats.

Yokoyama, N.; Maeda, K.; Tohya, Y.; Kawaguchi, Y.; Fujita, K.; Mikami, T.

Department of Veterinary Microbiology, Faculty of Agriculture, University of Tokyo, 1-1-1 Yayoi, Bunkyo-ku, Tokyo 113, Japan.

Vaccine vol. 14 (17/18): p.1657-1663

Publication Year: 1996

ISSN: 0264-410X --

Language: English

Document Type: Journal article

An entire open reading frame encoding the capsid protein of feline calicivirus (FCV) F4 strain was inserted into the deletion locus (SmaI site) of the thymidine kinase (TK) deficient mutant (C7301dlTK) of feline herpesvirus type 1 (FHV-1) and the resulting recombinant virus was designated as C7301dlTK-Cap. Expression of the FCV antigens by

QR189.42
Adonis

No comparison
with conventional.

C7301dlTK-Cap was confirmed by indirect immunofluorescence assay and immunoblot analysis. To assess whether the recombinant virus can induce virus neutralizing (VN) antibody against FCV in the natural host, 3 cats were inoculated intranasally and orally with C7301dlTK-Cap (2 cats) or C7301dlTK (1 cat). Sera collected from cats inoculated with the C7301dlTK-Cap possessed VN antibody against FCV. This recombinant virus is expected as a new polyvalent recombinant vaccine against FHV-1 and FCV infections. 48 ref.

? b 155

24jul03 13:40:14 User208669 Session D2351.1

\$0.28 0.079 DialUnits File1

\$0.28 Estimated cost File1

\$0.01 TELNET

\$0.29 Estimated cost this search

\$0.29 Estimated total session cost 0.079 DialUnits

File 155: MEDLINE(R) 1966-2003/Jul W3

(c) format only 2003 The Dialog Corp.

*File 155: Medline has been reloaded and accession numbers have changed. Please see HELP NEWS 155.

Set Items Description

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? s vaccine and vector and herpes?

73268 VACCINE

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66721 HERPES?

S1 100 VACCINE AND VECTOR AND HERPES?

? s dt=review?

S2 946386 DT=REVIEW?

? s s1 and s2

100 S1

946386 S2

S3 17 S1 AND S2

? t s37/5

37/5

DIALOG(R) File 155: MEDLINE(R)

(c) format only 2003 The Dialog Corp. All rts. reserv.

11633787 99067521 PMID: 9850535

New approaches to the development of virus vaccines for veterinary use.

Yamanouchi K; Barrett T; Kai C

Nippon Institute for Biological Science, Tokyo, Japan.

Revue scientifique et technique (International Office of Epizootics) (

FRANCE) Dec 1998, 17 (3) p641-53, ISSN 0253-1933 Journal Code:

8712301

Document type: Journal Article; Review; Review, Tutorial

Language: ENGLISH

Main Citation Owner: NLM

Record type: Completed

The marked progress in recombinant deoxyribonucleic acid (DNA) technology during the past decade has led to the development of a variety of safe new vaccine vectors which are capable of efficiently expressing foreign immunogens. These have been based on a variety of virus types--poxviruses, herpesviruses and adenoviruses--and have led to the production of many new potential recombinant vaccines. Of these recombinant vaccines, the rabies

vaccine, in which the rabies G protein is expressed in a vaccinia vector, has been widely used in the field to prevent the spread of rabies both in Europe and in the United States of America. A recombinant Newcastle disease virus vaccine, using fowlpox virus as the vector to express immunogenic proteins from the Newcastle disease virus, has been licensed as the first commercial recombinant vectored vaccine. Many other recombinant virus vaccines are still at the stage of laboratory or field testing. The most recent breakthrough in vaccinology has been the success with the use of naked DNA as a means of vaccination. This approach has shown great promise in mouse model systems and has now become the most active field in new vaccine development. Molecular redesigning of conventional ribonucleic acid (RNA) viruses to obtain more stable attenuated vaccines was previously possible only for positive-strand RNA viruses, such as poliovirus. However, recent advances in molecular biological techniques have enabled the rescuing of negative-strand viruses from DNA copies of their genomes. This has made it possible to engineer specific changes in the genomes of Rhabdoviridae and Paramyxoviridae, both of which include several viruses of veterinary importance. The authors describe the current progress in the development of vector vaccines, DNA vaccines and vaccines based on engineered positive- and negative-strand RNA virus genomes, with special emphasis on their application to diseases of veterinary importance. (61 Refs.)

Record Date Created: 19990209

Record Date Completed: 19990209

? save temp

Temp SearchSave "TD817" stored

? b 50;exs

24jul03 13:43:09 User208669 Session D2351.2

\$2.26 0.708 DialUnits File155

\$0.00 17 Type(s) in Format 6

\$0.21 1 Type(s) in Format 7

\$0.21 18 Types

\$2.47 Estimated cost File155

\$0.70 TELNET

\$3.17 Estimated cost this search

\$3.46 Estimated total session cost 0.787 DialUnits

File 50: CAB Abstracts 1972-2003/Jun

(c) 2003 CAB International

*File 50: Truncating CC codes is recommended for full retrieval.

See Help News50 for details.

Set Items Description

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Executing TD817

24494 VACCINE

29235 VECTOR

15637 HERPES?
S1 47 VACCINE AND VECTOR AND HERPES?
S2 0 DT=REVIEW?

47 S1
0 S2

S3 0 S1 AND S2

? ds

Set Items Description

S1 47 VACCINE AND VECTOR AND HERPES?

S2 0 DT=REVIEW?

S3 0 S1 AND S2

? s herpes? and rabies? and vector?

15637 HERPES?

7257 RABIES?

55210 VECTOR?

S4 13 HERPES? AND RABIES? AND VECTOR?

? ts47/5 11

47/5

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03600697 CAB Accession Number: 982213582

Biological and immunogenic properties of rabies virus glycoprotein expressed by canine herpesvirus vector.

Xuan XueNan; Tuchiya, K.; Sato, I.; Nishikawa, Y.; Onoderaz, Y.; Takashima, Y.; Yamamoto, A.; Katsumata, A.; Iwata, A.; Ueda, S.; Mikami, T.; Otsuka, H.

Department of Global Agricultural Science, Graduate School of Agricultural Science, University of Tokyo, 1-1-1 Yayoi, Bunkyo-ku, Tokyo 113, Japan.

Vaccine vol. 16 (9/10): p.969-976

Publication Year: 1998

ISSN: 0264-410X --

Language: English

Document Type: Journal article

To evaluate whether canine herpesvirus (CHV) could be used as a live vector for the expression of heterologous immunogenes, a recombinant canine herpesvirus (CHV) expressing glycoprotein (G protein) of rabies virus (RV) was constructed. The gene of G protein was inserted within the thymidine kinase gene of CHV YP11mu strain under the control of the human cytomegalovirus immediate early promoter. The G protein expressed by the recombinant CHV was processed and transported to the cell surface as in RV infected cells, and showed the same biological activities, including pH-dependent cell fusion and haemadsorption. The antigenic authenticity of the recombinant G protein was confirmed by a panel of monoclonal antibodies specific for G protein. Dogs inoculated intranasally with the recombinant CHV produced higher titres of virus neutralizing antibodies against RV than those inoculated with a commercial, inactivated rabies

vaccine. It is suggested that the CHV recombinant-expressing G protein could be used as a vaccine to control canine rabies and that CHV may be useful as a vector to develop live recombinant vaccines against other infectious diseases in dogs. 48 ref.

47/11

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02533106 CAB Accession Number: 922264833

Recombinant vectored viral vaccines for the control of virus diseases.

Gibbs, E. P. J.

College of Veterinary Medicine, University of Florida, Gainesville, FL 32610, USA.

Veterinary Annual vol. 31 p.20-31

Publication Year: 1991

ISSN: 0083-5870 --

ISBN: 0-632-03264-2

Language: English

Document Type: Journal article

After a brief introduction on vaccine evolution and modern vaccine technology, recombinant DNA technology is described in relation to the construction of recombinant vectored virus vaccines. Applications of pox virus recombinant vectored vaccines are described with reference to rinderpest, foot and mouth disease, Venezuelan equine encephalitis and rabies. Herpesviruses and adenoviruses as recombinant vectors are also briefly described and questions of safety and the future use of recombinant vaccines discussed. 49 ref.

? ts37/14

37/14

>>>Item 14 is not within valid item range

? ts17/26 31 33 35 41 42 46

17/26

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03497156 CAB Accession Number: 982202569

Immunization of cattle with a BHV1 vector vaccine or a DNA vaccine both coding for the G protein of BRSV.

Schrijver, R. S.; Langedijk, J. P. M.; Keil, G. M.; Middel, W. G. J.; Maris-Veldhuis, M.; Oirschot, J. T. van; Rijsewijk, F. A. M.

Institute for Animal Science and Health (ID-DLO), Department of Mammalian Virology, P.O. Box 65, NL 8200 AB, Lelystad, Netherlands.

Vaccine vol. 15 (17/18): p.1908-1916

Publication Year: 1997

ISSN: 0264-410X --

Language: English

Document Type: Journal article

A gE-negative bovine herpesvirus 1 (BHV1) vector vaccine carrying a gene

22/18 9.33 27

coding for the G protein of bovine respiratory syncytial virus (BRSV) (BHV1/BRSV-G) induced the same high degree of protection in calves against BRSV infection and BHV1 infection as a multivalent commercial vaccine. A DNA plasmid vaccine, carrying the same gene as the BHV1/BRSV-G vaccine, significantly reduced BRSV shedding after BRSV infection compared with that in control calves, but less well than the BHV1/BRSV-G vaccine. Flow cytometric analysis showed a significant relative increase of gamma / delta + T cells in peripheral blood after BRSV challenge-infection of the calves of the control group but not in the vaccinated groups. These results indicate that the G protein of BRSV can induce significant protection against BRSV infection in cattle, and that the BHV1/BRSV-G vaccine protects effectively against a subsequent BRSV and BHV1 infection. 38 ref.

1/7/31

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03246794 CAB Accession Number: 962209728

Recombinant channel catfish virus (Ictalurid herpesvirus 1) can express foreign genes and induce antibody production against the gene product.

Zhang, H. G.; Hanson, L. A.

College of Veterinary Medicine, P.O. Box 9825, Mississippi State, MS 39762, USA.

Journal of Fish Diseases vol. 19 (2): p.121-128

Publication Year: 1996

ISSN: 0140-7775 --

Language: English

Document Type: Journal article

The potential use of channel catfish virus (CCV) as a vaccine vector was investigated by inserting the *Escherichia coli lacZ* gene into the CCV genome and evaluating the immune response to the foreign gene product in catfish exposed to the recombinant. The recombinant virus was produced by inserting the *lacZ* in reading frame with the ATG start codon of the CCV thymidine kinase (TK) gene in the recombinant transfer plasmid pBSCV457. The plasmid was then cotransfected with CCV DNA in a TK gene-mediated selectable homologous recombination. The resultant construct (CCVlacZ) was TK-, and contained the *lacZ* gene at both TK loci in the genome. BETA -Galactosidase expression in infected catfish virus ovary (CCO) cells reached 0.53 micro g/106 CCO cells at 12 h after infection. When channel catfish fingerlings were exposed to CCVlacZ, these developed an antibody response to the inserted foreign gene product which peaked at approx. 15-20 days after infection. Additionally, the anti- BETA -galactosidase response was significantly enhanced when the fingerlings were re-exposed to the virus 20 days after the initial exposure. It is concluded that foreign genes can be inserted into and expressed by CCV and could be used as vaccine vectors. 18 ref.

1/7/33

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03117967 CAB Accession Number: 952217486

Construction of recombinant Marek's disease virus type 1 (MDV1) expressing the *Escherichia coli lacZ* gene as a possible live vaccine vector: the US10 gene of MDV1 as a stable insertion site.

Sakaguchi, M.; Hirayama, Y.; Maeda, H.; Matsuo, K.; Yamamoto, M.; Hirai, K.

The Chemo-Sero Therapeutic Research Institute, Kikuchi, Research Center, Kyokushi Kikuchi, Kumamoto 869-12, Japan.

Vaccine vol. 12 (10): p.953-957

Publication Year: 1994

ISSN: 0264-410X --

Language: English

Document Type: Journal article

The construction is described of a recombinant Marek's disease serotype 1 (MDV1) in which the *Escherichia coli lacZ* gene was inserted into the open reading frame homologous to the US10 gene of herpes simplex virus 1 (HSV1). The recombinant virus replicated as well in cell culture as the parental MDV1 K-554 strain. Chickens immunized with the virus were protected against challenge with virulent MDV1, and produced a high level of antibodies against beta -galactosidase as well as against MDV1 antigens. The antibody titres persisted for at least 16 weeks. It was concluded that the US10 gene of MDV1 is an effective site for the insertion of foreign genes from which to construct a polyvalent live vaccine for poultry. 28 ref.

1/7/35

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02975306 CAB Accession Number: 952202537

Construction of recombinant infectious laryngotracheitis virus expressing the *LacZ* gene of *E. coli* with thymidine kinase gene.

Okamura, H.; Sakaguchi, M.; Honda, T.; Taneno, A.; Matsuo, K.; Yamada, S.

Chemo-Sero Therapeutic Research Institute, 668 Okubo, Shimizu-machi, Kumamoto 860, Japan.

Journal of Veterinary Medical Science vol. 56 (4): p.799-801

Publication Year: 1994

ISSN: 0021-5295 --

Language: English

Document Type: Journal article

The construction of the recombinant avian laryngotracheitis virus with the TK gene is described. The growth property of the recombinant virus was almost the same as the parental CE strain in chicken embryo fibroblasts. It is concluded that the recombinant CE strain of infectious virus could

be used as a live vaccine vector. 26 ref.

1/7/41

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02450213 CAB Accession Number: 912255197

Infectious bovine rhinotracheitis virus vector that expresses foot-and-mouth disease virus epitopes on the surface of viral particles and virus-infected cells.

Kit, M.; Kit, S.; Little, S.; DiMarchi, R.; Gale, C.

Novagene Incorporated, Houston, TX 77057, USA.

Vaccines 91. Modern approaches to new vaccines including prevention of AIDS

p.327-331

Publication Year: 1991

Editors: Chanock, R.M.; Ginsberg, H.S.; Brown, F.; Lerner, R.A.

Publisher: Cold Spring Harbor Laboratory Press -- Cold Spring Harbor, NY 11724, USA

ISBN: 0-87969-367-3

Language: English

Document Type: Miscellaneous

The vector virus used to construct the IBRV-FMDV recombinant was the IBRV(NG) dlk, having thymidine kinase gene deletion and Novagene signature sequence insertion. Foreign DNA sequences inserted in-phase at the amino-terminal end of the IBR gIII gene are detailed. The genotype and phenotype of the recombinant were confirmed. Calves vaccinated i.m. developed virus-neutralizing antibodies to IBRV and protection from challenge; the significant concentrations of anti-FMDV antibodies are tabulated, and these were attained 21-28 days after vaccination. Protection from challenge with FMDV intradermally at 21 days was confirmed. The advantages of the recombinant included in vivo amplification of the FMDV VPi epitope, low cost of production without adjuvants, and, as a marker vaccine; vaccinated cattle and those infected with FMDV field strains can be distinguished serologically. 4 ref.

1/7/42

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02425551 CAB Accession Number: 912253212

Annual Report of the Institute for Animal Health 1990.

UK, Agricultural and Food Research Council

92 pp.

Publication Year: 1991

Director Professor F. J. Bourne

Publisher: Institute for Animal Health -- Compton, Newbury, Berks, UK

Language: English

Document Type: Annual report

In the Foreword to this report the extensive restructuring of the Institute, both physical and scientific, is mentioned. Building work at the Compton site for relocation of poultry work from Houghton was under progress, new Divisions of research had been formed and Heads appointed. The research programme is aimed at both immune and non-immune approaches to controlling disease. The main part of this report (pp. 20-71) consists of research reports on diseases of cattle, pigs, poultry and sheep.

Highlights of research referred to in the general report are: studies on the BSE agent in relation to scrapie strains; cloning of the ovine PrP gene; possibilities of Marek's disease virus and turkey herpesvirus as vaccine vectors; incorporation of a retroviral vector in chick embryos; isolation of a toxin from Bordetella bronchiseptica associated with atrophic rhinitis in pigs; definition of antigenic sites of foot and mouth disease virus; development of a competitive ELISA for bluetongue and an improved assay for African horse sickness; effects in vivo of a cytotoxic haemolysin from Treponema hyodysenteriae; culture method for mammary epithelial cells; monoclonal antibody against bovine respiratory syncytial virus adapted for use in man; role of interferon-gamma in the immune response to coccidiosis; developments towards a recombinant vaccine against infectious bursal disease. 220 ref.

1/7/46

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02046195 CAB Accession Number: 880167768

Pseudorabies virus as a live virus vector for expression of foreign genes.

Thomsen, D. R.; Marotti, K. R.; Palermo, D. P.; Post, L. E.

Molecular Biology Research, Upjohn Company, Kalamazoo, MI 49001, USA.

Gene vol. 57 (2-3): p.261-265

Publication Year: 1987

ISSN: 0378-1119 --

Language: English

Document Type: Journal article

The cDNA coding for human tissue plasminogen activator (tPA) was cloned downstream from the promoter for pseudorabies virus (PRV) glycoprotein, and flanked by downstream PRV DNA. After co-transfection with PRV DNA, this plasmid recombined to insert the tPA cDNA into the viral genome. In rabbit skin cells infected by this recombinant virus, tPA was detected by immunoprecipitation analysis and by enzymatic activity. Since it has a wide host range but does not infect humans, PRV is a possible vaccine vector for genes from animal pathogens. 18 ref.

? ds

Set Items Description

S1 47 VACCINE AND VECTOR AND HERPES?

S2 0 DT=REVIEW?

S3 0 S1 AND S2
S4 13 HERPES? AND RABIES? AND VECTOR?

? vaccine? and vector? and herpes? not s1

>>>Unrecognizable Command

? s vaccine? and vector? and herpes? not s1

37129 VACCINE?

55210 VECTOR?

15637 HERPES?

47 S1

S5 78 VACCINE? AND VECTOR? AND HERPES? NOT S1

? s57/38 39 43 48 50 51 54 55 57-61 63 64 66-68 77

57/38

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03344954 CAB Accession Number: 972204302

Recombinant feline herpesvirus type 1 expressing immunogenic proteins inducible virus neutralizing antibody against feline calicivirus in cats.

Yokoyama, N.; Maeda, K.; Tohya, Y.; Kawaguchi, Y.; Fujita, K.; Mikami, T.

Department of Veterinary Microbiology, Faculty of Agriculture, University of Tokyo, 1-1-1 Yayoi, Bunkyo-ku, Tokyo 113, Japan.

Vaccine vol. 14 (17/18): p.1657-1663

Publication Year: 1996

ISSN: 0264-410X --

Language: English

Document Type: Journal article

An entire open reading frame encoding the capsid protein of feline calicivirus (FCV) F4 strain was inserted into the deletion locus (SmaI site) of the thymidine kinase (TK) deficient mutant (C7301dITK) of feline herpesvirus type 1 (FHV-1) and the resulting recombinant virus was designated as C7301dITK-Cap. Expression of the FCV antigens by C7301dITK-Cap was confirmed by indirect immunofluorescence assay and immunoblot analysis. To assess whether the recombinant virus can induce virus neutralizing (VN) antibody against FCV in the natural host, 3 cats were inoculated intranasally and orally with C7301dITK-Cap (2 cats) or C7301dITK (1 cat). Sera collected from cats inoculated with the C7301dITK-Cap possessed VN antibody against FCV. This recombinant virus is expected as a new polyvalent recombinant vaccine against FHV-1 and FCV infections. 48 ref.

57/39

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03344505 CAB Accession Number: 972203853

Vaccination against feline leukaemia using a new feline herpesvirus type 1 vector.

Willemse, M. J.; Schooneveld, S. H. B. van; Chalmers, W. S. K.;

Sondermeijer, P. J. A.

Virological Research Department, Intervet International B.V., P.O. Box 31, Boxmeer, Netherlands.

Vaccine vol. 14 (16): p.1511-1516

Publication Year: 1996

ISSN: 0264-410X --

Language: English

Document Type: Journal article

A recombinant feline herpesvirus type 1 (FHV-1) was constructed expressing the envelope glycoprotein gene from feline leukaemia virus (FeLV). The expression cassette containing the long terminal repeat promoter from Rous sarcoma virus was stably integrated at the locus downstream of the gC homologue in FHV-1. Oronasal vaccination with recombinant FHV-1 gave significant protection against challenge with the homologous FeLV-A/Glasgow-1 isolate. Three of 4 vaccinated cats did not become viraemic for FeLV and developed serum neutralizing antibodies while 5 of 6 controls became persistently infected after challenge. Latent FeLV was detected at 12 weeks after challenge in bone marrow cultures of all animals except one. The potential of this new vector to protect against FeLV was compared with previous reports using live recombinant vaccines. 34 ref.

57/43

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03221159 CAB Accession Number: 962207137

New horizons in biotech vaccines.

Shapiro, D.

Zootechnica International vol. 18 (11): p.46-48

Publication Year: 1995

ISSN: 0392-0593 --

Language: English

Document Type: Journal article

57/48

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03097883 CAB Accession Number: 952215591

Construction of recombinant avian infectious laryngotracheitis virus expressing the beta -galactosidase gene and DNA sequencing of the insertion region.

Guo PeiXuan; Scholz, E.; Maloney, B.; Welniak, E.

Department of Veterinary Pathobiology, Purdue University, West Lafayette, IN 47907, USA.

Virology (New York) vol. 202 (2): p.771-781

Publication Year: 1994

ISSN: 0042-6822 --

022/181. v82
Admin 3

Language: English

Document Type: Journal article

A 4-kbp EcoRI DNA fragment of infectious laryngotracheitis virus (ILT.V) was cloned into plasmid pCU13 and sequenced. Computer prediction identified 2 potential open reading frames with 216 and 259 amino acid residues. The 259-amino-acid polypeptide was serine rich. The beta-galactosidase (beta-Gal) gene of *E. coli* was cloned into the XhoI/bglII site of this DNA fragment, integrated into the ILTV genome by homologous recombination, and expressed under the control of the immediate-early cytomegalovirus promoter; this recombinant formed blue plaques in the presence of X-gal. The insertion of a foreign gene into the ILTV genome and the successful expression of the incorporation gene showed the potential for the construction of attenuated recombinant ILTV vaccines and the development of ILTV as vectors for polyvalent vaccines against avian upper respiratory tract infections. 62 ref.

5/7/50

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03079583 CAB Accession Number: 952213394

Immunization trial of cats with a replication-defective adenovirus type 5 expressing the ENV gene of feline immunodeficiency virus.

Gonun, P.; Fournier, A.; Oualikene, W.; Morailon, A.; Eloit, M.

Laboratoire de Genetique Moleculaire, Genetique virale, INRA, Ecole Nationale Veterinaire, 7 avenue du General de Gaulle, 94704 Maisons Alfort, France.

Veterinary Microbiology vol. 45 (4): p.393-401

Publication Year: 1995

ISSN: 0378-1135 --

Language: English

Document Type: Journal article

The aim of this study was to develop a recombinant replication-defective adenovirus suitable for the vaccination of cats against feline immunodeficiency virus. It was found that this vector was able to transfer a marker gene (*E. coli* beta-galactosidase) in feline cells in vitro. An adenovirus type 5 expressing the feline immunodeficiency virus (FIV) envelope (ENV) gene of the Wo isolate in the absence of the rev gene (Ad-ENV-Wo) was constructed. Ad-ENV-Wo was then tested in 4 cats in a 3 injections scheme (at day 0, day 30 and day 210). Four other control cats received Ad-gp50, a similar recombinant adenovirus expressing gp50 (Ad-gp50) of Aujeszky virus (PRV). Viruses were formulated in two different kinds of oil adjuvants (water/oil and water/oil/water), a protocol previously shown to enhance the immune response against the virus-induced protein. The control cats developed neutralizing antibodies against PRV, demonstrating the potency of recombinant human adenovirus 5 (Ad5) as a vector in cats. Antibody responses appeared after the first injection and were higher with the water/oil/water formulation than with

the water/oil controls. However, none of the 4 cats vaccinated with Ad-ENV-Wo developed antibodies against two peptides of the envelope protein. Animals were challenged with 20 infectious doses 50% of the strain Wo. All of them developed antibodies against FIV within 4 to 5 weeks, and FIV virus could be isolated from all. 23 ref.

5/7/51

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03032191 CAB Accession Number: 952209053

Attenuation and recombination of genetically engineered pseudorabies virus vaccines and vectors.

Glazenburg, K.

139 pp.

Publication Year: 1995

Publisher: Faculteit Diergeneeskunde, Universiteit, Utrecht. --

Netherlands

ISBN: 90-393-0677-X

Language: English Summary Language: dutch

Document Type: Thesis

The author was member of a team at the Department of Virology of the Dutch Central Veterinary Institute (Lelystad) which attenuated Aujeszky herpesvirus by genetic modification. Details have been published in 6 journal articles, copies of which are included in the thesis. many ref.

5/7/54

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02842332 CAB Accession Number: 942205574

Avian herpesvirus as a live viral vector for the expression of heterologous antigens.

Sondermeijer, P. J. A.; Claessens, J. A. J.; Jenniskens, P. E.; Mockett, A. P. A.; Thijssen, R. A. J.; Willemse, M. J.; Morgan, R. W.

Conference Title: Proceedings 19th World's Poultry Congress Amsterdam 19-24 September 1992: Volume 1.

p.164

Publication Year: 1992

Publisher: -- ===,

ISBN: 90-71463-56-7

Language: English

Document Type: Miscellaneous

1 ref.

5/7/55

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02842328 CAB Accession Number: 942205570

- Construction and properties of a herpesvirus of turkeys recombinant expressing the Marek's disease virus homologue of glycoprotein B (gB) of herpes simplex virus.
 Ross, L. J. N.; Binns, M. M.; Tyers, P.; Pastorek, J.; Zelnik, V.; Scott, S.
 Conference Title: Proceedings 19th World's Poultry Congress Amsterdam 19-24 September 1992: Volume 1.
 p.144-149
 Publication Year: 1992
 Publisher: --
 ISBN: 90-71463-56-7
 Language: English
 Document Type: Miscellaneous
 8 ref.
- 5/7/57
 DIALOG(R)File 50:CAB Abstracts
 (c) 2003 CAB International. All rts. reserv.
 02740987 CAB Accession Number: 930461798
 Recent advances in bovine vaccine technology.
 Yancy, R. J., Jr.
 Animal Health Therapeutics Research, Upjohn Co., Kalamazoo, MI 49001, USA.
 Journal of Dairy Science vol. 76 (8): p.2418-2436
 Publication Year: 1993
 ISSN: 0022-0302 --
 Language: English
 Document Type: Journal article
 A description of new commercial and experimental vaccines for viral and bacterial diseases of cattle can be broadly divided into those used for both beef and dairy cows, and those used predominantly in dairy cattle. For both types of cattle, newer and experimental vaccines are directed against several of the important viral (e.g. bovine herpesvirus 1, bovine viral diarrhoea virus, bovine respiratory syncytial virus, parainfluenza type 3 and foot-and-mouth disease virus) and bacterial pathogens (e.g. Pasteurella spp., Haemophilus somnus). The viral vaccines include gene-deleted, modified live, subunit and peptide antigens. Newer bacterial vaccines, particularly those for Pasteurella spp., are composed of either modified-live vaccines or bacterins supplemented with toxoid or surface antigens. Haemophilus somnus vaccine research has concentrated mainly on defining unique surface antigens. Novel dairy cow vaccines would include the lipopolysaccharide-core (J5) antigen approach, which has been used for successful immunization against coliform mastitis. Core antigen vaccines also have reduced calf mortality from Gram-negative pathogens. Staphylococcal mastitis vaccines that contain capsular antigens, toxoids, or the staphylococcal fibronectin receptor are of active research interest. Vaccines against mastitis induced by Streptococcus agalactiae
- and Streptococcus uberis are also areas of intensive research. Delivery of multiple subunit antigens with optimal immune response induction has led to the investigation of attenuated heterologous viral and bacterial expression vectors such as bovine herpesvirus 1, vaccinia and Salmonella spp. This discussion also demonstrated that molecular biology is being used to advance bovine vaccine technology. 174 ref.
- 5/7/58
 DIALOG(R)File 50:CAB Abstracts
 (c) 2003 CAB International. All rts. reserv.
 02686706 CAB Accession Number: 932281693
 Construction and properties of a turkey herpesvirus recombinant expressing the Marek's disease virus homologue of glycoprotein B of herpes simplex virus.
 Ross, L. J. N.; Binns, M. M.; Tyers, P.; Pastorek, J.; Zelnik, V.; Scott, S.
 AFRC Institute for Animal Health, Houghton Laboratory, Houghton, Huntingdon PE17 2DA, UK.
 Journal of General Virology vol. 74 (3): p.371-377
 Publication Year: 1993
 ISSN: 0022-1317 --
 Language: English
 Document Type: Journal article
 A herpesvirus of turkeys (HVT) recombinant containing a 3.9 kbp fragment of Marek's disease virus (MDV) DNA encoding MDV glycoprotein B (gB), stably integrated into the thymidine kinase (TK) gene of HVT, was constructed. The replication of the recombinant in chick embryo fibroblasts (CEF) was comparable to that of wild-type HVT. The recombinant expressed authentic MDV gB and its processed forms (110K, 65K and 48K) in CEF as shown by immunoblotting using an MDV-specific anti-peptide serum. Northern blot analysis showed that MDV gB mRNA was transcribed from MDV promoter sequences flanking the MDV gB open reading frame and also from the HVT TK promoter. However, the level of replication of the recombinant in vivo appeared to be lower than wild-type HVT as shown by the titres of HVT antibodies, determined by ELISA. Pathogenicity tests showed that the recombinant was safe and did not cause microscopic or gross Marek's disease lesions or other abnormalities. The results suggest that HVT has potential as a vector from recombinant vaccines. 22 ref.
- 5/7/59
 DIALOG(R)File 50:CAB Abstracts
 (c) 2003 CAB International. All rts. reserv.
 02675378 CAB Accession Number: 932280403
 Avian herpesvirus as a live viral vector for the expression of heterologous antigens.
 Sondermeijer, P. J. A.; Claessens, J. A. P.; Jenniskens, P. E.; Mockett, A. P. A.; Thijssen, R. A. J.; Willemse, M. J.; Morgan, R. W.

Virological Research Department, Intervet International, PO Box 31, 5830 AA Boxmeer, Netherlands.

Vaccine vol. 11 (3): p.349-358

Publication Year: 1993

ISSN: 0264-410X --

Language: English

Document Type: Journal article

Control of Marek's disease in the poultry industry has been successfully achieved for several decades by large-scale vaccination of day-old chickens with live herpesvirus of turkeys (HVT) strains. Several features of this virus including lack of pathogenicity and long-term immune protection due to a persistent viraeic infection suggested the use of HVT as a live viral vector for the expression of foreign antigens. Potential sites for the integration of foreign DNA in the unique short region of the HVT genome were identified by the insertion of a beta-galactosidase expression cassette. Vaccination trials with recombinant virus strains indicated that the marker gene was expressed and stably maintained during animal passage. Based on an insertion site mapping in one of the open reading frames of the unique short region, a general recombination vector was designed for the integration of foreign genes into HVT. Recombinant virus-directed expression of individual antigens from Newcastle disease virus was driven by a strong promoter element derived from the long terminal repeat sequence of Rous sarcoma virus. 43 ref.

5/7/60

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02613520 CAB Accession Number: 920198365

Live recombinant viral vaccines.

Tartaglia, J.; Paoletti, E.

Viogenetics Corporation, 465 Jordan Road, Rensselaer Technology Park, Troy, NY 12180, USA.

Immunochemistry of viruses II: the basis for serodiagnosis and vaccines. p.125-151

Publication Year: 1990

Publisher: -- Amsterdam, Netherlands

ISBN: 0-444-81182-6

Language: English

Document Type: Miscellaneous

New vaccine types are greatly needed in both the human and veterinary fields to either complement or replace existing conventional vaccines.

This is due either to the inability to generate safe and effective

vaccines by conventional means or to the inherent limitations of

conventional vaccines. Advances in molecular biology and biochemical

procedures have brought forth a new era in the development of live and

inactivated vaccines, which hold promise for overcoming the limitations of

conventional vaccines. Animal viruses such as adenoviruses, herpesviruses

and poxviruses have been engineered as vaccine candidates. These vectors may provide advantages over other approaches since upon viral replication the foreign gene is amplified, increasing the antigen load. Additionally, foreign antigens should be processed and presented to immune effector cells in a manner similar to natural infection. The engineering of adenoviruses, herpesvirus (cytomegalovirus, herpes simplex virus, pseudorabies virus, varicella-zoster virus), and poxviruses (vaccinia and fowlpox virus) as expression vectors is discussed, and their potential use as live recombinant vaccine candidates for both human and veterinary use is examined. A brief description of the biology of these virus families is also provided for an understanding of their molecular biology and potential limitations as live vectors. 203 ref.

5/7/61

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02594628 CAB Accession Number: 922271066

The use of feline herpesvirus and baculovirus as vaccine vectors for the gag and env genes of feline leukaemia virus.

Wardley, R. C.; Berlinski, P. J.; Thomsen, D. R.; Meyer, A. L.; Post, L. E.

Animal Health Therapeutics Research, The Upjohn Company, 7000 Portage Road, Kalamazoo, MI 49001-0199, USA.

Journal of General Virology vol. 73 (7): p.1811-1818

Publication Year: 1992

ISSN: 0022-1317 --

Language: English

Document Type: Journal article

The env and gag genes from feline leukaemia virus were expressed in a thymidine kinase-negative feline herpesvirus and a baculovirus. Cats were vaccinated with various combinations of these recombinant viruses and 100% protection against feline leukaemia virus challenge was achieved using an immunization schedule which utilized both env and gag products delivered at both a mucosal and systemic site. 50 ref.

5/7/63

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02544937 CAB Accession Number: 922230460

Expression of pseudorabies virus and foot-and-mouth disease virus proteins by modified-live infectious bovine rhinotracheitis virus vectors. Kit, S.; Kit, M.

Proceedings - Annual Meeting of the United States Animal Health

Association vol. 94 p.66-75

Publication Year: 1990 --

Language: English

Document Type: Journal article

13 ref.

5/7/64

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02533106 CAB Accession Number: 922264833

Recombinant vectored viral vaccines for the control of virus diseases.

Gibbs, E. P. J.

College of Veterinary Medicine, University of Florida, Gainesville, FL 32610, USA.

Veterinary Annual vol. 31 p.20-31

Publication Year: 1991

ISSN: 0083-5870 --

ISBN: 0-632-03264-2

Language: English

Document Type: Journal article

After a brief introduction on vaccine evolution and modern vaccine technology, recombinant DNA technology is described in relation to the construction of recombinant vectored virus vaccines. Applications of pox virus recombinant vectored vaccines are described with reference to rinderpest, foot and mouth disease, Venezuelan equine encephalitis and rabies. Herpesviruses and adenoviruses as recombinant vectors are also briefly described and questions of safety and the future use of recombinant vaccines discussed. 49 ref.

5/7/66

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02450212 CAB Accession Number: 912255196

Recombinant feline herpesviruses as vectors for vaccination against retrovirus infection in cats.

Nunberg, J.-H.; Cole, G. E.; Stacy-Phipps, S.; Petrovskis, E. A.;

Wardley, R. C.; Post, L. E.

Cetus Corporation, Emeryville, CA 94608, USA.

Vaccines 91. Modern approaches to new vaccines including prevention of AIDS

p.191-195

Publication Year: 1991

Editors: Chanock, R.M.; Ginsberg, H.S.; Brown, F.; Lerner, R.A.

Publisher: Cold Spring Harbor Laboratory Press -- Cold Spring Harbor, NY 11724, USA

ISBN: 0-87969-367-3

Language: English

Document Type: Miscellaneous

This is a summary of the construction and characterization of recombinant feline herpesviruses (FHV) expressing the viral envelope (env) and gag genes of feline leukaemia virus (FeLV). A recombinant thymidine

kinase-deficient (TK-) FHV bearing a deletion within TK was generated using standard methods of marker rescue. Of several herpesvirus promoters evaluated for expression cassettes, the human cytomegalovirus major early promoter was found to be highly active and responsive to trans-activation by FHV. The expression of the FeLV env is described. (A detailed description of this work was published by Cole, G.E. et al. in Journal of Virology (1990) 64, 4930-4938). 5 ref.

5/7/67

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02439355 CAB Accession Number: 912254831

Bovine herpesvirus-1 (infectious bovine rhinotracheitis virus)-based viral vector which expresses foot-and-mouth disease epitopes.

Kit, M.; Kit, S.; Little, S. P.; Marchi, R. D. di; Gale, G.

S. Kit, Baylor College of Medicine, 1 Baylor Plaza, Houston, TX 77030, USA.

Vaccine vol. 9 (8): p.564-572

Publication Year: 1991

ISSN: 0264-410X --

Language: English

Document Type: Journal article

A recombinant IBR IPV virus (IBRV) vector was constructed to express bovine growth hormone signal sequence plus a foot-and mouth disease virus (FMDV (01K)) capsid protein (VP1) epitope as the N-terminal sequence of an IBRV glycoprotein gIII fusion protein on the surface of virus infected cells and on the surface of virus particles. Sequences encoding the first 38 amino acids of IBRV gIII were deleted from the recombinant to avoid redundant glycoprotein signal sequences, but IBRV gIII epitopes detected by anti-gIII monoclonal antibodies were retained. Phenotypes were confirmed by in situ immunostaining of virus plaques with anti-FMDV peptide sera, by immunogold staining of permeabilized- and non-permeabilized infected cells, and by virus neutralization experiments with anti-FMDV peptide sera. Vaccination with the IBRV-FMDV recombinant induced protective levels of anti-FMDV antibodies in calves and protected them from challenge with virulent IBRV. 34 ref.

5/7/68

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02425760 CAB Accession Number: 912253638

Pseudorabies virus, a possible vector for live vaccines in livestock animals.

Post, L. E.; Thomsen, D. R.

Viral vectors: current communications in molecular biology p.73-77

Publication Year: 1988

see patent list - ad?

Editors: Y. Gluzman; S.H. Hughes
 Publisher: Cold Spring Harbour Laboratory -- Cold Spring Harbour, NY
 11724, USA
 ISBN: 0-87969-316-9 (paper-back)
 Language: English
 Document Type: Miscellaneous
 10 ref.

57/77

DIALOG(R)File 50:CAB Abstracts
 (c) 2003 CAB International. All rts. reserv.
 02031492 CAB Accession Number: 882281388

The construction, selection, characterization, and application of
 recombinant herpes viruses.

Ackermann, M.

Eidg. Vakzine Inst., Hagenaustr. 74, CH-4025 Basel, Switzerland.
 Journal of Veterinary Medicine, B (Infectious Diseases, Immunology, Food
 Hygiene, Veterinary Public Health) vol. 35 (5): p.379-396
 Publication Year: 1988 --

Language: English Summary Language: german

Document Type: Journal article

Various strategies exist for the construction and selection of
 recombinant herpes viruses. In order to separate recombinant progeny from
 the parent viruses, it is necessary to characterize the viruses carefully
 before and after the recombination events. It is possible to favour the
 growth of recombinants and to minimize the replication of the parent
 viruses at the same time by the application of pressure, in most cases
 using the viral thymidine kinase (TK) as selectable enzyme. In certain
 instances recombinants may also be picked directly out of a mixed
 population following nondestructive identification of surface antigens. A
 large range of applications is open to recombinant herpes virus. They may
 be used for mapping genes, their products, and even sequences responsible
 for the regulation of the gene expression. This knowledge may be applied
 for the general understanding of the biology of the herpes viruses. A most
 promising application of recombinant herpes viruses may be their use as
 vectors for the expression of foreign genes, e.g. in vaccine research.
 Herpes viruses are able to express foreign genes at high levels.
 Furthermore, they specify foreign proteins with similar posttranslational
 modifications as the authentic gene product. 59 ref.

? s rabies and recombinant

7241 RABIES

22014 RECOMBINANT

S6 233 RABIES AND RECOMBINANT

? s py<1997 and s6

3418087 PY<1997

233 S6

S7 154 PY<1997 AND S6

? t s 77/10 15 49 60 81 113 114 118 125
 77/10

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03321348 CAB Accession Number: 972200538

Human adenovirus type 5 vectors expressing rabies glycoprotein.

Yarosh, O. K.; Wandeler, A. I.; Graham, F. L.; Campbell, J. B.; Prevec,
 L.

Department of Biology, McMaster University, 1280 Main Street West,
 Hamilton, ON L8S 4K1, Canada.

Vaccine vol. 14 (13): p.1257-1264

Publication Year: 1996

ISSN: 0264-410X --

Language: English

Document Type: Journal article

It has previously been shown that AdRG1, a replication competent
 recombinant human adenovirus type 5 (Ad5) expressing a rabies glycoprotein
 (RG), can induce immunity to rabies in rodent, canine, and skunk model
 systems. Two new replication competent vectors were constructed and
 compared. AdRG1.3, which carries RG with accompanying SV40 polyA addition
 sequences within an E3 deletion, and AdRG4, which has RG in the E3
 deletion but under the control of an exogenous Ad2 major late promoter,
 both expressed higher levels of RG in permissive cell culture than did
 AdRG1 and both elicited high levels of serum anti-rabies antibodies by
 parenteral or oral routes in mice and skunks, respectively. It is
 suggested that AdRG1.3 may be a more effective vaccine vector in species
 which are non-permissive for the replication of human Ad5. 47 ref.

77/15

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

03270796 CAB Accession Number: 962212373

A replication-defective human adenovirus recombinant serves as a highly
 efficacious vaccine carrier.

Zhi QuanXiang; Yang YiPing; Wilson, J. M.; Ertl, H. C. J.

Virology (New York) vol. 219 (1): p.220-227

Publication Year: 1996

ISSN: 0042-6822 --

Language: English

Document Type: Journal article

31 ref.

77/49

DIALOG(R)File 50:CAB Abstracts

(c) 2003 CAB International. All rts. reserv.

02814504 CAB Accession Number: 942202696

Role of biotechnology in the development of new and more efficient

vaccines for veterinary use.

Mehmood, A. A.; Iqbal, M. P.
Pakistan Veterinary Journal vol. 11 (1): p.1-8
Publication Year: 1991
ISSN: 0253-8318 --
Language: English
Document Type: Journal article
27 ref.

7/7/60

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02699257 CAB Accession Number: 932283461
Approaches for genetic purity testing of live recombinant viral vaccines using a human adenovirus:rabies model.
Lutze-Wallace, C.; Sapp, T.; Nadin-Davis, S. A.; Wandeler, A.
Biologics Evaluation Laboratory, Immunology Section, Animal Diseases Research Institute, Agriculture Canada, P.O. Box 11300, Station H, Nepean, Ontario K2H 8P9, Canada.

Canadian Journal of Veterinary Research vol. 56 (4): p.360-364

Publication Year: 1992
ISSN: 0830-9000 --
Language: English Summary Language: french
Document Type: Journal article

A 2-part purity testing regimen for genetically engineered live viral vaccines is described using a human adenovirus 5:rabies glycoprotein gene recombinant as a model vaccine. Initially, restriction endonuclease analysis of the recombinant viral genome verified the integrity of the recombinant construct and identified the vector genome. The second stage employed the polymerase chain reaction to facilitate a more detailed study of the target rabies glycoprotein cassette. The size of the target region was predicted from known nucleic acid sequence information and compared to that obtained after electrophoresis with molecular weight standards. Digestion of the polymerase chain reaction product with a second restriction endonuclease cleaved the target into a number of small fragments. Resolution of the fragments by gel electrophoresis allowed analysis of the target region alone, verifying its identity and integrity.
21 ref.

7/7/81

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02533106 CAB Accession Number: 922264833
Recombinant vectored viral vaccines for the control of virus diseases.
Gibbs, E. P. J.
College of Veterinary Medicine, University of Florida, Gainesville, FL 32610, USA.

Veterinary Annual vol. 31 p.20-31
Publication Year: 1991
ISSN: 0083-5870 --
ISBN: 0-632-03264-2
Language: English
Document Type: Journal article

After a brief introduction on vaccine evolution and modern vaccine technology, recombinant DNA technology is described in relation to the construction of recombinant vectored virus vaccines. Applications of pox virus recombinant vectored vaccines are described with reference to rinderpest, foot and mouth disease, Venezuelan equine encephalitis and rabies. Herpesviruses and adenoviruses as recombinant vectors are also briefly described and questions of safety and the future use of recombinant vaccines discussed. 49 ref.

7/7/113

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02248407 CAB Accession Number: 902204462
A recombinant human adenovirus vaccine against rabies.
Prevec, L.; Campbell, J. B.; Christie, B. S.; Belbeck, L.; Graham, F. L.
Dr. L. Prevec, Department of Biology, LSB-429, McMaster University, Hamilton, Ontario, L8S 4K1, Canada.
Journal of Infectious Diseases vol. 161 (1): p.27-30
Publication Year: 1990
ISSN: 0022-1899 --
Language: English
Document Type: Journal article

The control and worldwide eradication of rabies depends on the development of safe, effective, and economical vaccines that might be used in preexposure vaccination programs for man and animals. An infectious human adenovirus type 5 recombinant virus that contains the rabies glycoprotein gene, and which may serve as the prototype for a new class of vaccines against rabies, was constructed and tested. This recombinant, when administered by either the parenteral or oronasal route, was highly effective in eliciting good levels of rabies-neutralizing antibodies in the sera of dogs and mice. Mice immunized by the recombinant virus were protected from lethal intracerebral challenge with rabies virus. 20 ref.

7/7/114

DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02240218 CAB Accession Number: 900176702
Infectious recombinant vectored virus vaccines.
Esposito, J. J.; Murphy, F. A.
Division of Viral Diseases, Center for Infectious Diseases, Centers for Disease Control, Atlanta, GA, USA.

- Advances in Veterinary Science and Comparative Medicine vol. 33
p.195-247
- Publication Year: 1989
ISSN: 0065-3519 --
Language: English
Document Type: Journal article
- A review. The biological, molecular and immunological characteristics of vaccinia virus and other viruses are described in relation to their potential use as vectored viral vaccines for humans and animals. The technology of heterologous gene transfer into vaccinia virus is summarised. The development of experimental vectored vaccinia virus vaccines against rabies, Lassa fever, Venezuelan Equine encephalitis and influenza is described. The potential of genetically engineered vaccines for human and animal use is outlined. 224 ref.
- 7/7/118
DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02199298 CAB Accession Number: 902299103
Safety and efficacy of a human adenovirus recombinant containing rabies glycoprotein gene in skunks.
Artois, M.; Charlton, K.; Prevec, L.; Graham, F. L.; Campbell, J.
Conference Title: First Congress, European Society for Veterinary Virology, Liege, Belgium, 6-7 April, 1989. Abstracts.
p.5
Publication Year: 1989
Publisher: Duphar-Solvay Animal Health -- Brussels, Belgium
Language: English
Document Type: Abstract only
- 7/7/125
DIALOG(R)File 50:CAB Abstracts
(c) 2003 CAB International. All rts. reserv.
02150194 CAB Accession Number: 892293505
Oral vaccination of dogs fed canine adenovirus in baits.
Baer, G. M.; Brooks, R. C.; Foggin, C. M.
USDHHS, Rabies Lab., Cent. Dis. Control, Lawrenceville, GA 30246, USA.
American Journal of Veterinary Research vol. 50 (6): p.836-837
Publication Year: 1989
ISSN: 0002-9645 --
Language: English
Document Type: Journal article
- Canine adenovirus-2 which causes a mild but highly infectious upper respiratory tract disease was investigated as a possible vector for a recombinant rabies-adenovirus vaccine. Six groups of 5 dogs were each fed dilutions of canine adenovirus-2 either on raw liquid or on cornmeal bait. Four weeks after vaccination 29 of the 30 dogs had developed high titres
- of neutralizing antibodies. 14 ref.
? ds
- Set Items Description
S1 47 VACCINE AND VECTOR AND HERPES?
S2 0 DT=REVIEW?
S3 0 S1 AND S2
S4 13 HERPES? AND RABIES? AND VECTOR?
S5 78 VACCINE? AND VECTOR? AND HERPES? NOT S1
S6 233 RABIES AND RECOMBINANT
S7 154 PY<1997 AND S6
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\$74.00 37 Type(s) in Format 7
\$74.00 329 Types
\$83.33 Estimated cost File50
\$6.52 TELNET.
\$89.85 Estimated cost this search
\$93.31 Estimated total session cost 2.861 DialUnits
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DIALOG(R)File 357:Derwent Biotech Res.

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0229641 DBR Accession No.: 98-11238

Biological and immunogenic properties of rabies virus glycoprotein expressed by canine herpes virus vector - used for infection recombinant vaccine

AUTHOR: Xuan X; Tuchiya K; Sato I; Nishikawa Y; Onoderaz Y; Takashima Y; Yamamoto A; Katsumata A; Iwata A; Ueda S; Mikami T; +Otsuka H
CORPORATE AFFILIATE: Univ.Tokyo Nippon-Inst Biol.Sci.
CORPORATE SOURCE: Department of Global Agricultural Science, GraduateSchool of Agricultural Science, University of Tokyo, 1-1-1 Yayoi,
Bunkyo-ku, Tokyo 113, Japan.

JOURNAL: Vaccine (16, 9-10, 969-76) 1998

ISSN: 0264-410X CODEN: VACCDE

LANGUAGE: English

ABSTRACT: The potential use of dog herpes virus as a vector for the expression of heterologous immunogenes, was investigated by using a dog rabies virus vector to express a rabies virus glycoprotein (G-protein). The gene was inserted within the dog herpes virus YP11mu thymidine-kinase (EC-2.7.1.21) gene, under the control of the human cytomegalo virus immediate early promoter. The G-protein was expressed, processed and transported to the cell surface as in rabies virus-infected cells, and showed the same activities such as low pH-dependent cell fusion and hemagglutination. The antigenicity of the G-protein was confirmed by monoclonal antibodies specific for G-protein, and dogs inoculated intranasally with the recombinant vector produced higher titers of virus-neutralizing antibodies than those inoculated with a commercially available, inactivated rabies virus vaccine. The results indicate that a dog herpes virus expressing the G-protein may be used as a vaccine to control rabies and potentially other infectious diseases in dogs. (48 ref)

17/62

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0160632 DBR Accession No.: 94-03183 PATENT

Pseudorabies disease virus recombinant vaccine - comprising a pseudorabies virus deletion mutant

PATENT ASSIGNEE: Akzo 1994

PATENT NUMBER: WO 9401573 PATENT DATE: 940120 WPI ACCESSION NO.: 94-053076 (9404)

PRIORITY APPLIC. NO.: EP 92202096 APPLIC. DATE: 920709

NATIONAL APPLIC. NO.: WO 93NL146 APPLIC. DATE: 930708

LANGUAGE: English

ABSTRACT: A vaccine for preventing and/or controlling an animal disease comprises a pseudorabies virus containing glycoprotein gp50 and has a mutation in its gp50, gp63 or gI genes. Also claimed is the use of a herpes virus mutant, which can only spread by means of virus-induced cell-to-cell transmission and which yields non-infectious progeny virions, for the production of vaccines. The herpes virus mutants have nucleotide sequences incorporated into them encoding an antigen or fragment from another pathogen. The mutation is preferably a deletion or an insertion of a heterologous gene. Preferably the virus has more than 1 mutation in one of its other genes e.g. gp63 or gI gene. The vaccine is useful for preventing and/or controlling Aujeszky disease. In an example, the gp50 gene of pseudorabies virus strain NIA-3 was replaced by a DNA fragment containing the E1 gene of pig-cholera virus. Plasmid pBP53E1 was thus constructed and was cotransfected with viral DNA of pseudorabies strain NIA-3 in G5 cells by lipofection. Recombinants expressing E1 were isolated and protected pigs from swine fever. (29pp)

17/66

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0128887 DBR Accession No.: 92-01379

Nucleotide sequence and transcriptional mapping of the major capsid protein gene of pseudorabies virus - monoclonal antibody production and hybridoma construction; vaccinia virus vector; potential rabies recombinant virus

AUTHOR: Yamada S; Imada T; Watanabe W; Honda Y; Nakajima-Iijima S; +Sekikawa K

CORPORATE AFFILIATE: Mitsubishi-Synth. Chem.

CORPORATE SOURCE: National Institute of Animal Health, Tsukuba Science City, Ibaraki 305, Japan.

JOURNAL: Virology (185, 1, 56-66) 1991

CODEN: VIRLAX

LANGUAGE: English

ABSTRACT: The pseudorabies virus (PrV) 142-kDa major capsid protein (MCP142) gene was isolated and sequenced. The MCP142 gene had a single open reading frame of 3993 nucleotides (nt) encoding 1330 amino acids. The 4400-nt major RNA from the MCP142 gene was detected in PrV-infected cells. The 5' end of the transcript was 60 nt upstream of the initiation codon. The 3' end of the transcript was 18 nt downstream of a putative poly(A) signal sequence TATAAA and 133 nt downstream of the termination codon. MCP exhibited 58% homology with herpes simplex virus type 1 and varicella-zoster virus, 27% with Epstein-Barr virus, and 24% with human herpes virus-6 and human cytomegalo virus. It had greater homology with alpha-herpes viruses than with beta- or gamma-herpes

viruses. To characterize the immunogenic properties of MCP142 of PrV, mice and rabbits were immunized by recombinant vaccinia virus expressing MCP142. Monoclonal antibodies were prepared against MCP142 by s.c. (twice) and then i.p. immunization of BALB/c mice with PrV Indiana strain 6, and fusion of spleen cells with P3-X63-Ag8-U1 cells to form hybridomas. (30 ref)

1/7/68

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0122752 DBR Accession No.: 91-10394

The live vector approach - viruses - recombinant vaccine construction; a review (conference paper)

AUTHOR: Mackett M

CORPORATE SOURCE: Cancer Research Campaign Laboratories, Paterson Institute for Cancer Research, Christie Hospital and Holt Radium Institute, Wilmslow Road, Withington, Manchester, M20 9BX, UK.

JOURNAL: World J.Microbiol.Biotechnol. (7, 2, 137-49) 1991

CODEN: 9295H

LANGUAGE: English

ABSTRACT: Live recombinant vaccine production using virus vectors was reviewed, with reference to: engineering attenuated vaccines (expression of antigens in attenuated virus vaccines other than vaccinia virus, and engineering attenuation); engineering vaccinia virus; a general purpose expression system; immunological applications (identification of the targets for humoral immunity; generation of monoclonal antibodies; analysis of cytotoxic T-lymphocytes; antibody-dependent cellular cytotoxicity; potential vaccines; and complicating factors); attenuation of vaccinia strains (currently available strains, and engineered attenuation); and vectors based on vaccinia virus or other orthopox viruses for use in animal vaccines. Examples of vectors include those based on adeno virus-4, adeno virus-7, herpes simplex virus-1, varicella-zoster virus, polio virus-1, vaccinia virus. Examples of vaccines include those based on hepatitis B virus, Epstein-Barr virus, HIV virus-1, influenza virus, polyoma virus, rabies virus, yellow-fever virus, Rous-sarcoma virus, rinderpest virus, etc. (95 ref)

1/7/69

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0117935 DBR Accession No.: 91-05577

Viruses as delivery vectors for vaccines - recombinant vaccine production using a virus vector (conference paper)

AUTHOR: Fahey K J

CORPORATE SOURCE: Avian Diseases Program, CSIRO Division of Animal Health, Private Bag No. 1, P.O. Parkville 3052, Victoria, Australia.

JOURNAL: Aust.Biotechnol.Conf. (8 Meet., 129-33) 1989

CODEN: 9999Z

LANGUAGE: English

ABSTRACT: Recombinant vaccine production using virus vectors was discussed.

These vectors allow correct post-translational modification of immunogens and correct presentation to the immune system, often resulting in induction of protective antibody and cell-mediated immune responses. These vaccines are safe and cheap to produce, suitable for aerosol and oral administration, able to be engineered as multivalent vaccines, and useful in eradication programs. Vaccinia virus vectors have been used for insertion of antigen genes from hepatitis B virus, herpes simplex virus, influenza virus, rabies virus, respiratory-syncytial virus, vesicular-stomatitis virus, HIV virus, Epstein-Barr virus, Plasmodium knowlesi, Plasmodium falciparum, bird influenza virus, and Newcastle-disease virus. Other vectors include sheep-pox virus, cowpox virus, fowl-pox virus, herpes simplex virus, varicella-zoster virus, IBR-IPV virus, horse herpes virus, pig pseudorabies virus and turkey herpes virus. Vector construction of (by deletion of non-essential regions for insertion of foreign genes), and advantages and disadvantages of recombinant vaccines, were also discussed. (7 ref)

1/7/79

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0100472 DBR Accession No.: 90-03163

Viral vaccines: achievements and challenges - recombinant vaccine construction; a review

AUTHOR: Melnick J L

CORPORATE SOURCE: WHO Collaborating Centre for Virus Reference and Research, Department of Virology and Epidemiology, Baylor College of Medicine, Houston, Texas, USA.

JOURNAL: Acta Virol. (33, 5, 482-93) 1989

CODEN: AVIRA2

LANGUAGE: English

ABSTRACT: The present state of vaccination as a means to control viral diseases is reviewed, and the needs and directions for future investigations are considered. Topics discussed include vaccine development, current vaccines, killed virus vaccines, live attenuated virus vaccines, proper use of present vaccines, prospective vaccines, attenuation of viruses by genetic manipulation, use of recombinant avirulent virus vectors, purified proteins produced by use of cloned genes, synthetic peptides, anti-idiotypic vaccines, new conventionally prepared vaccines and time-frames for new vaccines. Steps requisite for demonstrating efficacy and safety of a viral vaccine are summarized, and features of target populations to be protected are noted. New vaccines undergoing research include those for cytomegalo virus, dengue

virus, hepatitis A virus, hepatitis B virus, herpes simplex virus-1 and 2, influenza virus-A and B, Japanese encephalitis virus, parainfluenza virus, rabies virus respiratory-syncytial virus, rota virus, varicella-zoster virus, yellow-fever virus and HIV virus. (8 ref)

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0090167 DBR Accession No.: 89-08158

Infectious recombinant vectored virus vaccines - construction and application of vaccine using pox virus, herpes virus, adeno virus (review)

AUTHOR: Esposito J J; Murphy F A

CORPORATE SOURCE: Division of Viral Diseases, Center for Infectious Diseases, Centers for Disease Control, Atlanta, Georgia, USA.

JOURNAL: Adv Vet.Sci.Comp.Med. (33, 195-247) 1989

CODEN: AVSCB8

LANGUAGE: English

ABSTRACT: The construction and application of infectious recombinant vectored virus vaccines are reviewed. 2 Classes of viral vectors are considered, one class comprising replication-deficient vector viruses, and the other, replication-competent viruses. Characteristics of pox viruses as vectors are discussed, and the advantages and disadvantages of vaccinia virus as a vaccine and as a vector are considered. The safety of vaccinia viruses is discussed, and the origins of NYBH and Lister strains of vaccinia virus are considered. General characteristics of pox viruses are reviewed, including virion structure, virus replication, virus genome, gene expression, phenotypic markers and the immune response to pox virus infection and vaccination. Pox virus vector construction and applications are considered, including gene transfer by marker rescue, and applications of vaccinia virus vectoring in vaccine development (rabies, lassa fever, Venezuelan horse encephalitis, influenza). Other infectious vectored virus vaccines include those from herpes virus and adeno virus. Future developments, and applications in developing countries are discussed. (242 ref)

1/7/87

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0066743 DBR Accession No.: 87-11091

Construction of an infectious pseudorabies virus recombinant expressing a glycoprotein gIII-beta-galactosidase fusion protein - plasmid pCL1407 vector construction, cloning

AUTHOR: Keeler Jr. C L; Whealy M E; +Enquist L W

CORPORATE AFFILIATE: Du-Pont

CORPORATE SOURCE: Cancer Research and Development Department, E. I. du Pont

de Nemours and Co., Experimental Station E328/B22, Wilmington, DE 19898, USA.

JOURNAL: Gene (50, 1-3, 215-24) 1986

CODEN: GENED6

LANGUAGE: English

ABSTRACT: An infectious herpes virus mutant has been constructed in which a major structural envelope glycoprotein gene was replaced by a hybrid gene encoding a novel fusion protein consisting of the N-terminus of the viral glycoprotein joined to Escherichia coli beta-galactosidase (EC-3.2.1.23). The pseudo rabies virus (PRV) gene for glycoprotein gIII located in a 4.3 kb fragment of pALM1 had an internal SacI fragment replaced with a synthetic EcoRI site. The E. coli lacZ gene was cloned into this site. The plasmid pCL1407 formed contained an in frame fusion of the gIII gene to the fourth codon of lacZ. The resulting hybrid gene was then used to replace the wild type gIII gene in the virus by cotransfection of the plasmid with PRV in PK15 cells. The viral recombinants were isolated by failure to react with monoclonal antibody specific for wild type gIII. A mutant virus, PRV-Z1 was chosen for further analysis. It expressed a glycosylated gIII-beta-galactosidase fusion protein in infected PK15 cells. The system will be useful for study of herpes virus envelope protein processing. (33 ref)

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S1 104 HERPES? AND RABIES

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